

REMARKS/ARGUMENTS

Re-examination and favorable reconsideration in light of the above amendments and the following comments are respectfully requested.

Claims 1 - 17 are pending in the application. Currently, no claim has been allowed.

By the present amendment, claims 1, 2, 4, 6, 8, 10 and 14 have been cancelled; claims 3, 5, 7, 9, 11, and 15 - 17 have been amended; and new claims 18 - 20 have been added to the case.

In the office action mailed March 11, 2005, claims 11 - 13 were rejected under 35 U.S.C. 112, second paragraph, as being indefinite; claims 1 - 3 and 6 - 17 were rejected under 35 U.S.C. 102(b) as being anticipated by U.S. Patent No. 3,249,293 to Koff; claims 1 - 4 and 6 - 17 were rejected under 35 U.S.C. 102(b) as being anticipated by U.S. Patent No. 4,483,054 to Ledwith; claims 1 - 5, 7, 8, and 10 - 17 were rejected under 35 U.S.C. 102(b) as being anticipated by U.S. Patent No. 5,156,525 to Ciokajlo; and claims 1 - 3 were rejected under 35 U.S.C. 102(b) as being anticipated by U.S. Patent No. 2,461,402 to Whitehead.

The foregoing rejections are traversed by the instant response.

The present invention relates to a turbine structure for use in a gas turbine engine. The turbine structure comprises a one piece drum rotor. The drum rotor including a plurality of turbine disks welded together and having a first diameter at a leading one of said turbine disks and a second diameter at a trailing one of said turbine disks wherein the first diameter is greater than the second diameter. The drum rotor further includes a plurality of integrally formed knife

elements and an integrally formed flange for allowing the one-piece drum rotor to be joined to an adjacent structure. The turbine structure further comprises a plurality of turbine blades attached to the one-piece drum rotor.

The present invention also relates to a method for installing a turbine structure into a turbine section of a gas turbine engine comprising the step of installing a one-piece drum rotor with an upstream set of turbine blades attached to the one-piece drum rotor. The installing step comprises joining the one-piece drum rotor to an adjacent structure via a flange and a nut and bolt arrangement.

New claim 18, as well as new claim 20, are allowable over the cited and applied references because none of the cited and applied references teaches or suggests a one-piece drum structure having the claimed turbine disk structure, the claimed integrally formed knife elements, and integrally formed flange.

Claims 3, 5, 7, 9, and 15 - 17 are allowable for the same reasons as their parent claims as well as on their own accord.

Method claim 19 is allowable because none of the cited and applied references teach or suggests the claimed installing step.

Claims 11 - 13 are allowable for the same reasons as claim 19 as well as on their own accord. With regard to claims 11 - 13, none of the cited and applied references teach or suggest the sequence of claimed method steps. For example, the Ledwith patent does not disclose installing a first array of stator vanes relative to the one-piece drum rotor after the installing step; or installing a second array of stator vanes and thereafter installing a third set of turbine blades. The stator vanes in Ledwith are installed at one time. Koff and Ciokajlo suffer from the same deficiencies.

With regard to the rejection under the second paragraph of 35 U.S.C. 112, this rejection is now moot in view of the amendments to claim 11.

For the foregoing reasons, the instant application is believed to be in condition for allowance. Such allowance is respectfully solicited.

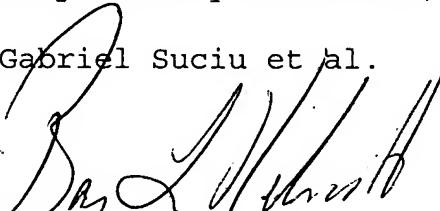
Should the Examiner believe an additional amendment is needed to place the case in condition for allowance, he is hereby invited to contact Applicants' attorney at the telephone number listed below.

A request for a one-month extension of time and a check in the amount of \$120.00 to cover the cost of the extension of time fee are enclosed herewith.

Should the Director determine that an additional fee is due, he is hereby authorized to charge said fee to Deposit Account No. 21-0279.

Respectfully submitted,

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Date: July 5, 2005

I, Nicole Motzer, hereby certify that this correspondence is being deposited with the United States Postal Service with sufficient postage as first class mail in an envelope addressed to: "Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313" on July 5, 2005.

